PEL-TEK'S
word
machine 3.0 plus

**An Integrated Word Processing
and Spell Check/Correct System
for the
TRS-80™ Mod I/III 48 K Disk System**

INTRODUCTION

The Word Machine 3.0 Plus package is an integrated system consisting of a Word Processing Module and a Spelling Checking/Correction Module. All programs operate in compiled Z80 Machine code. Compatible equipment is a TRS-80 Model I, III, or 4 operating in the Model III mode. The system requires one or more disk drives and 48K of memory.

With the integrated design of the Word Machine 3.0 Plus, all functions including text entry/editing, printing, spelling checking and corrections will process without re-entering D.O.S. See the tutorial in section 2.2 for a complete Wordprocessing/Correction session and in ten minutes from now you will have your first Wordprocessing creation printed, with your spelling corrected.

All distribution discettes contain the Word Machine 3.0 Plus programs with the TDOS operating system Micro System's Software's kernel D.O.S. for Software Publishers. TDOS is a powerful subset of M.S.S.'s popular DOSPLUS 3.4 operating system. As distributed, all you have to do is place disk 0 into drive 0, disk 1 in drive 1, push the Reset button, and you will be operating the Word processing system.

The Wordprocessing Module is an enhanced version of Pel-Tek's Word Machine 2.0. The differences between versions 2.0 and 3.0 are detailed in Appendix III. In the design of the Word Machine 3.0 wordprocessing module, several esoteric features were traded for a system that has a logical, common sense operating environment AND a minimum of Commands. A line oriented editing philosophy is followed which lends to an easy transition from the typewriter to the computer.

The Spell Check/Correct Module is the system that checks and allows corrections to your text. Details regarding the system design with program flows and file interactivities are discussed in Section 6.0. You should be familiar with the system design if you intend to transport the Word Machine 3.0 Plus system to another DOS or otherwise use all of the system or parts of it in a configuration other than the one distributed.

Every effort was made to make the Word Machine 3.0 Plus package a quality and error free product. We at Pel-Tek would appreciate any user feedback with regards to problems, bugs, or suggestions for future updates.

We wish you the best of luck with the Word Machine 3.0.

<div align="center">
Ed Levy
Pel-Tek
</div>
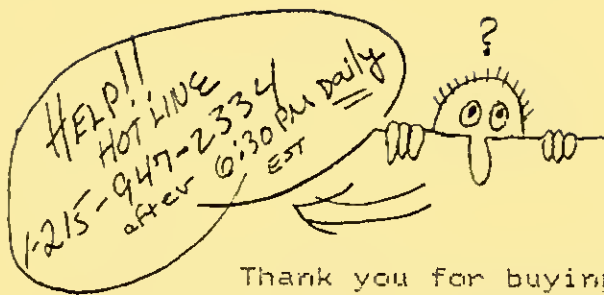
READ THIS FIRST

Thank you for buying the Word Machine 3.0 Plus. First things first however. There are a few things that you should know about the discettes that the Word Machine 3.0 Plus is distributed on. Also you should BACKUP the distribution discettes. Details are given below :

MODEL I VERSION

The Model I version includes the equivalent of three disks. Actually you have two disks but one of them has programs on BOTH SIDES. We will refer to these as Disk 0 - Side 1 (System Master), Disk 0 - Side 2 (Utilities), and Disk 1 (Dictionary). If you position the 2 sided disk with the "notch" up and towards you, the label describing the contents of that side will be on the right side. If you are uncertain as to the contents of a particular side you may type CAT (for Catalog) to the DOS PLUS prompt - the side with the Word-processor will contain programs WORD48/CMD and W248/CMD.

Both sides of Disk 0 contain the TDOS BACKUP utility and you can proceed with steps 2 through 5 as described under Model III BACKUP instructions below. You should BACKUP each side to its own disk.

Disk 1 does not contain any TDOS utilities, consequently the BACKUP utility should be invoked from either side 1 or 2 of Disk 0. Follow the procedure as described below:

■ Insert Disk 0 (either side 1 or 2) in Drive 0 and type "BACKUP" (without any parameters). Next place Disk 1 in Drive 0 and a blank disk in Drive 1.

■ TDOS will ask "Source Drive Number ?". Respond "0"

■ TDOS will next ask "Destination Drive Number ?". Respond "1".

■ Hit the (ENTER) key to "Backup date mm/dd/yy ?"

■ Disk 1 will proceed to be backed up to Drive 1 - refer to the included TDOS Manual for more details.

MODEL III VERSION

You have been provided with two disks: "DISK 0 - System Master", and "DISK 1 - Dictionary". Both disks contain the TDOS operating system which includes the BACKUP utility. Consequently you may initiate the BACKUP procedure for either Disk be placing the appropriate Word Machine Disk in Drive 0 and a blank Disk in Drive 1 and then hit the Reset Button.

1)   The AUTO function is invoked on Disk 0 which automatically starts the WORD48/CMD program. You may either type "QUIT" to the Word Machine Command prompt or press (ENTER) as the disk boots. Either way you will see the "DOS PLUS" prompt.

2)   Type "BACKUP :0 :1", respond with (ENTER) to the request for the Backup date.

3)   The disk will then Backup from Drive 0 to Drive 1.

4)   When done, insert Disk 1 into Drive 0 and proceed with step 2) above(place a new blank disk in Drive 1.)

5)   If you only have one drive - Type BACKUP :0 - respond with "0" to "Destination drive number ?" - hit (ENTER) to "Backup date" - TDOS will then prompt you to insert the necessary disks for Backing up. Refer to the TDOS manual for more details.

TABLE OF CONTENTS

1.0 - GENERAL CONCEPTS

1.1 The Command Mode
The Word Machine 3.0 Wordprocessing Module operates from a Command Mode that allows access to all Editing, Printing, and File I/O functions. When any function is complete, control returns to the Command Mode. A "Command Line" is displayed at the top of the screen at all times. This line is used for entering Commands, displaying program messages, and displaying the number of lines remaining in the Text Buffer.

The prompt "??" is used to request a Command Mode entry from the keyboard. Section 3.0 describes all Word Machine 3.0 Commands. A (H)elp Command is available that summarizes Commands during a wordprocessing session.

1.2 The Text buffer and Text lines
The term "Text Buffer" refers to the Memory space reserved for your text during a session. Space in the Buffer is available in terms of "lines" of text. Your text is entered line by line.

Lines may have a maximum length of 80 characters - a default of 62 is provided by the system. Line length may be varied during a session (see the Form Command) - but CANNOT be changed for printing the text (like full screen type editors).

This version of the Word Machine allows a maximum of 276 lines of text in the Buffer at any one time - however this does not limit the size of the document that you may print (discussed below in 1.3). The details of entering line by line text is covered in the discussions of the (F)ill and (I)nsert Commands. An internal "Line Pointer" references exactly where you are in the body of the text at any time. The (U)p and (D)own Commands (and their variations) allow you to re-position the Line Pointer for various Commands including: (E)diting, (I)nserting, and (K)illing lines, (P)rinting the Buffer, and inserting disk files into the text.

1.3 Printing documents larger than the Buffer
The SAVE and LOAD Commands allow you to save your buffer in a named disk file. These files may be LOADed for editing or inserting into another Buffer. These files may also be called during printout. Documents larger than you immediate Buffer may be printed by embedding print time (;G)et file control lines in your text. In this manner text files may be chain printed into a document of any virtual length - without any user interactions. This feature is also useful for "boiler plate" paragraphs - or even company letterheads that you wish to print using the printer. Details regarding this feature are covered in section 4.1.

1.4 Upper/Lower Case Considerations
Upper/lower case letters (if supported by your computer) will print as you type them. Commands from the Command mode and Print Time Controls (lines starting with ";") may be used with either upper or lower case letters (i.e. "FORM" or "form" are both OK).

■ Model I - NOT modified
Model I's will not print lower case letters on the screen. Internally however, lower case letters ARE generated by typing the [SHIFT] along with the letter at the same time. On normal printing, the shifted letter will print in the lowercase. This is opposite to normal practice. The Word Machine circumvents this problem by providing you with the option to have the printer routine REVERSE the case of the text at the time that it is printed. This allows you to type as if shifted letters are uppercase and un-shifted letters are lowercase. (See Section 4.1 , FORM Command Code no. 7).

■ Model I - MODIFIED with lowercase

The Word Machine programs themselves do not include a lowercase driver. However the TDOS operating system (that the programs are distributed on) has a self activating driver that resides in low memory. You will use the [SHIFT] [Ø] key combination to toggle between shift for uppercase and shift for lowercase.

If you transport the Word Machine programs to another DOS you may have to use the Radio Shack supplied ULCDVR/CMD program before using the Word Machine. Sufficient space is reserved in high memory to accommodate this program.

If you have a mod other than Radio Shack's the lowercase results are unpredictable and Pel-Tek cannot support them.

■ Model III

Use the [SHIFT] and [Ø] keys to toggle from uppercase to upper/lowercase modes.

1.5   Printer Compatibility

The Word Machine was written to be printer independent. Our evaluations have shown that it works quite well with all of the more popular printer on the market today. The ability to embed printer control codes between lines (Section 4.1), and within lines (Section 1.6) allow you to utilize your printer's special capabilities.

Your printer should have standard parallel port operation with automatic carriage returns. The program software uses counters for printing margins (top, bottom, left) and allows user specified page lengths. The FORM (print format) Command (see Section 4.2) actually allows the display and modification of some fifteen printing format variables within one display menu.

1.6   Embedding non-keyboard characters into your text

Out of 255 available "characters" only about 85 of them may be typed directly from the keyboard from both the Word Machine or any other type of program. These characters include all of the numbers letters (upper and lowercase) and other frequently used characters (i.e. period, comma, dollar sign , etc.). Under some circumstances you may have need to include the other "characters" in your text either for graphics or controlling your printer's special features. Two methods are available.

The keyboard sequence [^] [A] during text entry allows the entry of a specific three digit ASCII value (0-255), to be inserted directly into your text at the cursor position. The sequence [^ [G] for Graphics mode allows the use of the keypad pattern pressed on the 2,3,5,6,8,9 keys to match the six pixel arrangement of a TRS-80 graphics block. This method is the most convenient way to enter ASCII values 129-191 and allows continuous entry of graphics mixed with text. Refer to Table 1.0 for more details.

1.7   The Spelling Checker ("Spell Check/Correct System")

Typing CHECK in the Command Mode initiates the spelling checking system. Two drive systems are desirable for the most efficient use of this Module with the Dictionary Disk residing in Drive 1.

The interactions of all files and programs is invisible to the user, you will never enter D.O.S. during the checking process.

Checking is done in a literal word for word fashion. "Unknown" words (words not in the dictionary) are reported in text context in the correction phase . The user has several options that range from correcting the word to adding the word to your Auxiliary dictionary.

The Spell Check/Correct system is designed to be used independently from the Word Machine 3.0 integration. The integrated application is discussed in detail in Section 6.0. A separate manual (see the "Spell Check/Correct" manual) describes the independent use of the system with files created by any wordprocessor of your choice.

4

2.0 -Getting Started

Place your WORD MACHINE discette in Drive 0 and hit the reset button. Type "WORD48" from D.O.S. to start the program. It will be necessary for you to keep the discette in its drive at all times. Certain Word Machine Commands will require program segments from the overlay program W248/CMD from time to time. Consequently your drive will operate during the (H)elp, (FORM)at, (LOAD file), (SAVE file), and (PT)print Commands.

After the Word Machine banner appears, the prompt "??" will show on the top left on the Command line. The appropriate responses are discussed in Section 3.0 (The Command Mode).

Your very first Command may be on of the following:

    H   -To display a summary menu of Command Mode Commands

or,

    FORM   -To set Line Length, or any of 15 other Format variables

or,

    LOAD file -To recall a previously Saved Text File from disk

or,

    F   -To enter the "Fill" mode and begin typing in your Text

If you plan to check your spelling, place the dictionary diskette with file DICTNARY/DAT in Drive 1.

2.1 The WARM START or "how to save your neck"

When the WORD MACHINE starts it "senses" whether there is any text in the Buffer area. If you left a wordprocessing session by typing the OUIT Command, or if you hit the RESET Button, or if any type of accidental premature exit occurred, the "WARM START" can save your neck. If a filled Buffer is sensed, the following message will print:

"Type W for Warm Start"

Your choices at this point are: typing "W" or hitting [ENTER]

[ENTER]   Causes the Buffer to be cleared and all FORMAT variable will be set to their de-faults (see the FORM Command)

W   Will cause all data entered during the previous session to be RETAINED for the current session. Essentially you should be able to pick up from where you had previously left off.

You would want to use the "Warm Start" feature if you want to leave the Word Machine to use D.O.S.

2.2 A "Getting Started" Word Machine Tutorial

The following is a quickie course to get you into the Word Machine right away. This tutorial will accomplish typing a letter, printing it, checking the spelling, then saving it to disk for later retrieval.

■ Typing WORD48/CMD from D.O.S. will place you into the Word Machine's Command Mode. The prompt "??" appears at the top left, the remaining line count appears upper right, program messages will appear in the center.

5

■ To the ?? prompt type "F"[ENTER] (for the Fill Mode) and start typing. Hit the left and right ARROW Keys to move back and forth along a line (or [SHIFT] and ARROWS to Tab). See Table 1 for all special Line Editing functions.

■ The [▲] key acts as a control key while entering lines during the (F)ill, (I)nsert and (E)dit modes. It should be hit slightly before the second key necessary for the various editing functions.

■ You may type a line past the end of line mark - in which case any partial words will "wrap" down to the next line. Alternatively you may hit the [ENTER] Key at the end of the line - either way text entry will proceed continuously.

■ Terminate text entry by hitting [CLEAR] at the start of a new line. The line pointer will remain at the last line entered. You will then be back in the Command Mode with the ?? prompt.

■ To review your text type "T" (go to Top of text) then press the "D" key, hold it down and press [ENTER] simultaneously - your text will scroll down the screen. Tap the [ENTER] Key (with the D key depressed) and the text will stop scrolling with [ENTER] released. If you spot an error, re-enter the Command Mode by simply releasing the "D" key. You can scroll up by using the "U" key instead of "D".

■ Typing "E" in the Command mode will allow editing the current line. You may overtype, delete, or insert characters to correct your error - again refer to Table 1 for cursor and editing controls. Hit [ENTER] when done with your corrections to the line, you may cancel your corrections by hitting [CLEAR] instead.

■ You are now ready to print your creation. Type "PT" to print your text (from the top) on the printer. When printing is complete you will be returned to the Command Mode.

■ To check the spelling of your text type "CHECK" to the Command prompt and the checking/correcting process is initiated. Your text is automatically saved to a "work" file and is then compared against the dictionary file. For one drive users, the dictionary disk may be inserted into Drive 0 at the appropriate prompt. This checking procedure should take only a couple of minutes, even for longer documents. Your document will then be loaded into the corrections program where it is displayed with "unknown" words shown in context.
Refer to Section 6.0 that describes the various options available for corrections - option "2" for example will mark the "unknown" word for inclusion into a special "Auxiliary" dictionary, that is checked along with the main dictionary during the checking processes.

■ When done with corrections, the Word Machine is re-entered and your corrected document is loaded back into the Buffer. You may now Print (with "PT") your corrected text or Save it (with SAVE file) for later use.

■ Finish your Word Processing session by typing "QUIT" to the Command prompt - or start a new document by typing "NEW".

Naturally there are many other things you may want to do especially in the areas of formatting your text or creating form letters, or embedding special ASCII codes or Graphics in your text. The rest of this manual describes all of these various features.

Table 1.0
CURSOR CONTROL AND LINE EDITING

Cursor movements and line editing functions are controlled by special keys and key combinations. These keys are active in the (F)ill, (E)dit, and (I)nsert modes while entering or editing lines. The program uses a "non-destructive" horizontal Cursor - unless any of the special keys are typed – all letters typed will overtype existing text on the line.

The [↑] key functions as a "control key and should be hit slightly before the key listed to its right in the chart.

Special Keys and Key Combinations	Function
[ENTER]	Go to the next line for (F)ill or (I+)nsert Commands. Update line and return to Command Mode for (E)dit.
[CLEAR]	Exit from (F)ill or (I+)nsert. Cancel changes made in (E)dit or (I)nsert
[→]	Move Cursor right one space.
[←]	Move Cursor left one space
[SHIFT] [→]	Tab Cursor right.
[SHIFT] [←]	Tab Cursor left.
[↑] [I]	BEGIN CHARACTER INSERTS. A special Cursor will appear. Letters typed will then be inserted to the LEFT of the Cursor position and the rest of the line will move one space to the right for each character inserted. In the (E)dit mode, the line length increases automatically when text expands past the End-of-Line Mark
[↑] [D]	DELETE CHARACTER at the cursor position. All characters to the right of the Cursor will move left one space.
[↑] [G]	Begin GRAPHICS MODE. A special Graphic Cursor will appear. Block graphic patterns are entered by pressing 2,3,5,6,8 and 9 keys on the key-pad in combination corresponding to a six pixel TRS-80 graphics block. Pressing and releasing " " (period) on the key-pad will register the pattern on the screen
[↑]	Terminates Graphics and Insert modes. Inserting will end when any Special Key combinations are typed
[↑] [H]	HACK AND CLEAR from Cursor to end of line
[↑] [X]	EXTEND LINE. Position Cursor at the end of the line
[↑] [M]	MIDDLE - or CENTER the text on the line
[↑] [A]	ASCII input. The message "ASCII VALUE=" will appear at the top of the screen where a three digit ASCII Value (0-255) is entered. The appropriate ASCII code will then appear at the cursor position in the text.
[↑] [P]	Place PAUSE marker. This key should be used at the beginning and end of fields that you wish to replace by typing in entries while printing your text. For example on the line below, the NAME and DATE fields are marked for replacement at print time " .. Dear NAME HERE our talk on DATE was "
[↓]	Repeat Key - Hold down to repeat last character.

7

3.0 THE COMMAND MODE

A double question mark "??" signifies that you are in the Command Mode. Generally, all other modes of operation are entered via the Command Mode. Commands may contain one or more characters and requires hitting the [ENTER] key after entering the Command. Commands may be typed with EITHER Uppercase or Lowercase letters. You may substitute Lowercase letters for any of the Commands listed below.

H   **HELP.** Causes HELP screen to print. This screen has a brief summary of Command Mode Commands with descriptions.

NEW   **Clears the Buffer** and sets FORMAT print variables to their defaults. The system is completely re-initialized and allows the entry of completely new text.

QUIT   **Exit from the program and return to DOS.** Remember, the WARM START option will allow you to pick up where you left off.

F   **Start FILL Mode.** The Fill Mode is the most convenient way to initially enter text or extend existing text. The Line Pointer will automatically position itself at the bottom of the text whenever the (F)ill Command is executed. This will effectively allow you to extend your text at the bottom. The Line Pointer is positioned at the last line entered after leaving the Fill Mode.

When in the Fill Mode, the beginning of a line is marked by a dash "-" and the end is marked by the graphics character "] " (hereafter referred to as the "End of Line mark").

A flashing cursor indicates your position in a line at all times. Lines longer that 62 characters will carry over onto the next line on the screen. But although broken from line to line on the screen, these lines are treated as one continuous line within the Text Buffer. In case words are typed past the End Of Line Mark, the program has a "wraparound" feature that eliminates a broken word at the end of the line. The program will remove the word from the preceding line and place it at the beginning of the next line so that the word is not split from line to line.

Table 1.0 titled "Cursor Controls and Line Editing" gives the keys and key combinations that are allowed while typing in the Fill Mode. The ENTER key is hit to go to the next line (when done with a line). The CLEAR key will transfer control from the Fill Mode to the Command Mode.

I   **Insert single line.** Allows the insertion of one line between the Current Line and the following line. When done, the Line Pointer is at the new line inserted and control passes to the Command Mode.

I+   **Insert Multiple Lines.** (See (F)ill Mode above). Operates the same as the Fill Mode but allows inserting text lines between the current line and the following line (anywhere in the text). Hit CLEAR at a new line to transfer back to the Command Mode. When finished, the Line Pointer is at the last line inserted. See the D and U Commands for ways to re-position the Line Pointer.

T   **Top.** Move the Line Pointer to the top of the text buffer. The program is structured with a first line that does not print and CANNOT be modified (i.e. by K,R, or E commands). This allows you to insert text in front of the first line in your text.

8

B   **Bottom.** Moves the Line Pointer to the bottom of the text buffer. You may then insert at the end of your text.

PT   **Print from the Top.** Hardcopy line printing will start at the Top of the buffer.

PP   **Print from the line Pointer.** Printing will start from the line FOLLOWING the current line.

        Either of the above printing commands will cause the text to print until the end of the text, or until an embedded cancellation code is encountered, or when the [CLEAR] key is hit. See Section 4.0 for details regarding printing the Text Buffer.

E   **Edit.** This mode will allow character oriented editing to the current line. Table 1.0 "Cursor controls and Line Editing" covers all keys end key combinations for character oriented editing to the line. When done editing the line, hit the ENTER key, to CANCEL any changes made to the line hit CLEAR. Control transfers back to the Command Mode and the Line Pointer remains on that line.

EH   **Edit Header.** Creates and/or edits a header line that appears on the Top of every page when your text prints. The ability is included to mark the position for a page number with the "#" character. More details regarding Headers, Footers and page numbering is included in Section 4.3.

EF   **Edit Footer.** Similar to EF - allows creating and/or editing a Footer line that will appear on every page.

FORM   **Display/Change Printing Format variables.** A special screen is displayed indicating Code numbers and current values of the Format variables. These variables include Line length, Margins, Upper/Lower case reversal, spacing and others. Values of the variables may be changed in this screen with proper reference to the variable's Code number. See Section 4.2 for complete details.

K   **Kill (or Delete) the current line.** The line at the Line Pointer is deleted and the pointer is re-positioned to the following line. An Error message will print if you attempt to delete at the Top of your text .

KB   **Kill a Block of text.** The line starting with the Line Pointer and all lines DOWN the text will be deleted until one of the following is encountered:

      ■ A line with the characters ";K" in the first two positions. You would create this line as you would any normal line of text. This line will act as a "marker" to tell the program where to stop deleting. When it is encountered in the "KB" process the program will delete this "marker" line also so you need not worry about it remaining in your text.

      ■ The End of your Text. The program will delete to the end of your text if the ";K" line is not found. The program will check first to see if a ";K" line is in your text. If it is not, a Message "E.O.F. BEFORE ';K' DELETE Y/N ?" prints. This gives you the chance to escape if necessary (by typing "N"). If you DO want to DELETE to the End of your Text, then respond "Y".

9

LOAD *filespec* **Loads text file into the Buffer.** A previously SAVEd Word Machine text file may be recalled and placed into the Buffer. The text is INSERTED between the Line Pointer and the following line. The option is provided to Clear the Buffer prior to LOADing. See Section 5.3 for full details.

SAVE *filespec* **Save the text Buffer to Disk.** The entire Buffer may be saved to a named file with this Command. See Section 5.1 for details.

CHECK **Initiates the Spell Check/Correct Module.** More details regarding this process are discussed in Section 6.0. You should be prepared to insert your Dictionary Disk containing DICTNARY/DAT into Drive 1 (or Drive 0 for one Drive systems) The process goes though various stages including the Corrections process where possible misspelled words are identified in context and you are given various options with regards to their correction.

When you finish corrections - the text will be recalled to the Word Machine's Buffer with your corrections made. The Word Machine will be in the Command Mode with the line pointer at the Top.

→ **NOTE:** The following section describes the U and D Commands and their variations. These Commands are used for moving the Line Pointer to any desired line, and to search out strings within the Text. The method for "scrolling" the text is also covered.

D **Go DOWN one line** (move the line pointer down one line), print the line on the video screen. After printing, the program will return to the Command Mode.

U **Go UP one line.** Similar to the D Command.

Dstring **Go Down to the first line containing** "*string*" **AT THE BEGINNING of the line.** The program will ignore all blanks up to the first character on any line. If the string is located, the following will be done by the program:
- The line will print on the video screen,
- The Line Pointer will be set to the line,
- The Edit Mode will be entered automatically,
- The Cursor will be positioned at the first letter on the line.

With this Command you can locate any line in your text by reference to the FIRST WORD(S) OR CHARACTERS ON THE LINE. You will find this to be a fast convenient method for locating a particular line and re-positioning the Line Pointer. You should hit either the ENTER or CLEAR Keys to return to the Command Mode if you don't want to edit the line.

Ustring **GO UP to the first line that starts with** "*string*". This is similar to the D*string* Command except it searched up your text.

D/*string* **Go DOWN to the first line containing** "*string*" **EMBEDDED in the text.** This is similar to the D*string* Command except that the Cursor will be positioned at the beginning of the "*string*" when it is located. You may want to use this Command to find misspelled words etc. If you are not sure whether the "*string*" in question is UP or DOWN in you text, you should do the "T"(go to top) Command first then the D*string* or D/*string* Command.

U/*string*   **Go UP to the first line containing** *"string"* **EMBEDDED in the text.**
Similar to the D/*string* Command but searched UP the text.

Scrolling using the (U)p and (D)own keys

To scroll DOWN your text, depress the "D" key and HOLD IT DOWN, then press the ENTER key at the same time. The text will scroll while BOTH keys are held down. Now TAP the ENTER key - your text will stop scrolling whenever the ENTER key is released. You can browse your text line by line and pause at any line for as long as you like. If you spot something that you want to change, release the "D" key and re-enter the Command Mode. The Line Pointer will be at the last line printed on the screen. You may scroll UP your text in a similar manner by depressing the "U" key and ENTER keys together.

4.0 Printing your Text Buffer

Typing "PT" or "PP" in the Command Mode will cause your Text Buffer to print from the "Top" or from the line following the line "Pointer". Printing continues until the end of your Text. However you may terminate printing before the end of the text by hitting the CLEAR Key or embedding a termination code in your text (to be discussed). The Format variables (modified from within the FORM Command) allow you to specify margins, line length, page lengths, spacing, etc..

4.1 Embedded Print Time Controls

Any line starting with ";" (semi-colon) in the first character position functions as a print time control line. These lines are not intended for printing (but may be printed if Code 13 is set to 1 under the FORM Command). These printer control lines may appear anywhere in your text and you may use them as frequently as you like. Each control line will take up a space in the Buffer nowever.   The general form of a printer control line is:

$$;c1, c2, c3, ...$$

Where c1, c2, c3.... may be any of the following :

ASCII Values ASCII numbers will cause actions specific to your particular printer.
(0-255) The effect of a string of ASCII numbers would be equivelent to the BASIC Statement:
LPRINT CHR$(c1)CHR$(c2)CHR$(c3)...
Consequently numeric values between 0 and 255 MUST be used for c1, c2, c3.....

X Causes printing to stop. This letter must be at the END of the list. The line pointer will be positioned at the next line.

E Eject paper to the end of the page.

Enn Eject paper nn lines. The printer will skip lines using this code. If you need more that one space between lines or paragraphs - you will save Buffer space by using this code instead of printing blank lines. If the bottom of a page is encountered while ejecting in this manner, ejecting is not continued on the next page.

G filespec Get an external file and print it within the context of of the text buffer being printed. All currently active Format variables, page counts, line counts etc. will be maintained as the external file prints. Any Format variables set with the external file will be ignored. When finished printing the file, the Word Machine will close the file and continue printing the text buffer at the next line.
A document of any length may be "chain printed" using this feature. It is also useful for printing standard letterheads or other types of "boilerplate" text. The Buffer remains completely unaffected by printing the external file -since it is retrieved line by line.

Example of Print Time Control Codes

```
text..text..text.....
text....text..
;E10                     (Eject 10 lines)
text.text.text....
;27,56,E                 (Write codes 27 56 then Eject)
text...text..text..text....
;E                       (Eject to end of page)
text..text..text....
;G MYFILE/TXT            (Print file MYFILE/TXT in context)
text....text....text...
;X                       (Stop Printing)
```

4.2 Format Variables

See Table 2.0 for a description of all of the Format Variables. When you type "FORM" in the Command Mode you will get a full screen of Format variables and their current values. If values are not assigned when you start the program the program will assume default values that should be practical for most applications. If you had LOADed a disk file, the program may have used the Format values that were carried with the file.

Format may be changed selectively while viewing the "Format Variables" menu. Each variable is referenced by a unique Code number that must be entered before changing a value. In response to the message: "Enter CODE or hit ENTER to end entries ?" you should enter the Code number of the variable that you wish to change. When the word "VALUE ?" appears you should enter the new value. Your change will appear next to the appropriate variable immediately after entering it.

Variables with Codes 1 through 9 are carried with the Text file when the Buffer is SAVEed. There is no need to re-set the values when LOADing a Text file. Variable with Codes 10 through 15 are not saved and must be entered manually to use their functions.

TABLE 2.0
DESCRIPTION OF FORMAT VARIABLES

Variables 1-9 : Carried with Text when SAVED

CODE	DESCRIPTION	DEFAULT	EXPLANATION
1	Top Margin	7	The number of automatic carriage returns at the top of every page. Middle line used for Header and/or Page number.
2	Bottom Margin	7	Line allowance at bottom of page Middle line used for Footer and/or Page number.
3	Left Margin	8	Number of blank spaces printed at the beginning of each line. Note that any expanded print (if used) will also expand the left margin and may cause text to be offset from where anticipated.
4	Line Length	62	Nominal line length used for text entry during (F)ill, (E)dit, or (I)nsert modes. Will not readjust for printout. Be careful that the Left Margin plus Line Length doesn't exceed 80 characters for an 80 column printer or an overflow to the next print line may occur.
5	Page Length	66	Number of lines allowed on a page. For some printers with the ability to print 8 lines per inch you may want to specify a Page Length of 88.
6	Tab Spaces	6	Number of spaces tabbed right or left during text entry when [SHIFT] and arrow keys are hit together.
7	Reverse Caps	0 (no)	Reverse upper/lowercase at printout. An entry of 1 will allow those with unmodified Model I's to get upper/lowercase printouts. The text should have been typed with [SHIFT] key down for capital letters.
8	Header Data	(blank)	Single header line that prints on the middle line of the Top Margin. Must be modified with the "EH" Command.
9	Footer Data	(blank)	Single footer line that prints on the middle line of the Bottom Margin. Must be modified with the "EF" Command.

DESCRIPTION OF FORMAT VARIABLES (continued)

Variables 10-15 : Run time variables - changed prior to printout

CODE	DESCRIPTION	DEFAULT	EXPLANATION
10	No. Copies	1	Number of copies of the Text Buffer printed.
11	Spacing	1	Single (1) or double (2) spacing available.
12	First Page no.	0	Specifies first page number to print. Zero causes no page numbering. Page numbers are "fielded" into "#" marks on Header/Footer lines.
13	Print ; Line?	0 (no)	Specifies whether or not to print lines with print time entries (starting with ";"). If set to 1, these lines will print.
14	Exec ; Line ?	1 (yes)	Determines whether or not lines starting with ";" are executed. If set to zero these lines are not executed – but may be printed if 13 above is set to 1.
15	Pause Bottom?	0 (no)	If continuous paper is not being used then setting this variable to "1" will will pause printing for changing the paper at the bottom of the page.

4.3 Using Headers, Footers and Page numbering

Headers and Footers will print if they are entered via the Command Mode's EH(edit header) or EF(edit footer) commands. Although they show as codes 8 and 9 in the Format Variable's Menu - they cannot be modified from within the menu.

Headers and Footers will be positioned in the middle line of the Top and Bottom Margins (as specified by codes 1 and 2 in the Format Variable Menu) - as such you have limited ability to control the actual position of the Headers and Footers by fixing the top and bottom margin values accordingly.

Page numbers will print on Header and/or Footer lines and will appear on the line where marked by the character "#". Note that the default positioning of page numbers is in the center of a Footer line. Page numbering is controlled by proper specification of the page number variable (code 12 default 0). If the page numbering variable is set to zero then page numbering will be omitted (default). Otherwise page numbering may start at any number that is specified.

Page numbers will show on the Left for Odd numbered pages and on the Right for Even numbered pages if two "#" characters appear on Header/Footer lines as shown below:

    #   HEADER OR FOOTER LINE   #

4.4 Printing Form Letters

By combining the features of printing multiple copies (Format Variable code 10), and embedding "Pause" markers in your text (using the [↑][P] combination) - a useful form letter printing system is available. Instead of modifying lines in the Edit Mode to fill in a form, the Word Machine allows you to fill in the data AS THE TEXT PRINTS with prompts on the screen. Your entries are NOT saved permanently with your text but will be included with each line as it prints

When entering text a suitable prompt should be included between the the pause marks that describes data you wish to enter at that point in the text. Graphics and/or special characters are not available during these print time entries. The line length will adjust to your input from the keyboard. However, you should reserve enough space between the marks such that your input is approximately the same size as the marked space.

As the text prints - the line with the pause marks will appear on the screen with the cursor positioned below the field to be changed. Type in the new data and hit [ENTER]. If another field also appears on the same line, the cursor will position at that field after [ENTER] was hit to enter data into the prior field. The program checks to see if pause markers are "paired" and treats any text in-between as comments to be replaced. A single or unpaired pause mark will be ignored. (Technical note: ASCII 254 is used for the pause marker and as such isn't available for other uses or printing.)

5.0 Disc I/O - LOADing and SAVEing Document Files

5.1   Saving your Text Buffer (The SAVE *filespec* Command)

You will want to save your text buffer in a Disc file for many reasons. Your objective is to re-call the text at a later time to continue editing or to print it within the context of a larger document. You initiate the process of saving the buffer by typing "SAVE *filespec*" in the Command Mode.

Filespec refers to a File name. The File name may be one that you had previously used (if you went to replace the File), or a new File name. The Word Machine will then check your Directory to see if the File name is already being used. The program will respond accordingly with :

> " CREATE IT Y/N ? "   (if the File name IS NOT being used)
>
> or,
>
> " REPLACE IT Y/N ? "   (if the File name IS being used).

A response of "Y" in either case will tell the program to save your Buffer with the File name that you used. A response of "N" will cause the program to return to the Command Mode (it will NOT save your text). Once the File has been successfully saved the message : "FILE SAVED" will print.

A word about File names. Your file name and extension should follow standard D.O.S. specifications. For TDOS and most other D.O.S.'s this means an eight character Filename and a three character extension. The following would all be acceptable to the Word Machine:

T   TEXT   TEXTFILE/TXT   POETRY:1   TEXTPO/TXT:0

After the File is Saved the Line Pointer will be positioned at the last line of your text. The program will then return to the Command Mode.

Your file will be saved in an uncompressed ASCII format. The first record in the file will contain all of the Format Variable values. In case you have a need to use these variables for another application, the order in which the variables appear in the record are listed below:

Position	Variable	Type
1	TOP MARGIN	N
2	BOTTOM MARGIN	N
3	LEFT MARGIN	N
4	LINE LENGTH	N
5	PAGE LENGTH	N
6	TAB SPACING	N
7	REVERSE CAPS	N
8	HEADER LINE	A
9	FOOTER LINE	A

5.2   Files with "/DOC" extensions

Files with "/DOC" extensions (i.e. TEXT2/DOC) are SAVEd and LOADed WITHOUT the FORMAT variables at the beginning. This allows you to create files in a "pure" uncompressed ASCII format for use by other programs using ASCII files. This makes the Word Machine a suitable EDITOR for creating files for transmission to Bulletin Boards or Videotex systems.

If a file has a "/DOC" extension, it will be loaded without FORMAT variables set and defaults will be assumed.

5.3   Loading a Disc File (the LOAD *filespec* Command)

You can recall a Text File from Disc using the LOAD *filespec* Comand. The message "*NOT FOUND" will print if the file is not in your directory.

If the file IS found, the program checks to see it there is currently any Text in the Buffer. If there is, the program will respond with:

" [ENTER] KEY TO CLEAR BUFFER AND LOAD, 'I' TO INSERT " .
You respond:

[ENTER]   To clear any existing text form the Buffer and reclaim all of the Buffer space for the file that you are loading. Format variables WILL NOT be reset to defaults. This allows for Chain Printing of Text Files.

I   To INSERT the File within the current body of your text. The file will be inserted BETWEEN THE LINE POINTER AND THE FOLLOWING LINE. In this manner you may expand your existing Text by including the specified Text File.

Regardless of whether or not there is text in your Buffer when you type the LOAD Command the following message will print before the file is loaded into the Buffer:

" USE FILE'S PRE-SET FORMAT VALUES Y/N ? " .

You respond :

Y   To use the Format values being carried with the file (Codes 1-9),

N   To use the Format values currently set with the text.

Under normal circumstances when you are loading a File with no other text in the Buffer you will type "Y" to use the File's previously saved Format Values.

5.4   Loading tiles not created by the Word Machine

Any ASCII file with lines less than 80 characters long and saved in an uncompressed form may be read and edited by the Word Machine. HOWEVER these files MUST be RENAMEd with a DOC extension or else the Word Machine will not read them properly since the program expects format variables in the beginning of files not having DOC extensions.

A typical example would be a file downloaded from a Bulletin board service (ie or Videotex service such as Compuserve or Source). The Word machine will use the default line length of 62 unless otherwise specified from within the Format Variables menu prior to loading the file.

5.5   DISC I/O Errors

The Word Machine will respond with a numerical Error Code in case of a Disc I/O problem. Refer to your TRSDOS DISK BASIC Reference manual or the included TDOS manual for explanations of these Codes.

If the Error can be corrected from DOS (i.e. KILLing Files in case of a DISC FULL situation) you may type OUIT in the Command Mode to enter DOS. Make your corrections - then re-enter the Word Machine program. You should respond with "W" to the query " TYPE 'W' FOR WARM START ".

5.6 Disk Space Considerations when Saving Files

If you are using the Spell Check/Correct system, we recommend that you save your text files to a second drive. System Disk 0 requires sufficient space for a temporary file X/X, and the expandable user dictionary file AUX/DOC. Model I users running single density should be particulary cautious. A Drive 1 "Data" disk may be prepared by entering D.O.S. with the "OUIT" Command, then formatting a drive 1 disk with the D.O.S. Command line " FORMAT :1 ". Files saved to drive 1 should have file names in the form "Filename/Ext:1".

Single drive users should prepare a "Wordprocessing disk" by preparing a disk containing only WORD48/CMD and W248/CMD (BACKUP Disk 0, then KILL all other files) . In the Command Mode type "SAVE" (without a filespec), when the program requests "FILESPEC" , insert your Wordprocessing disk, enter the file name and file will be saved . When the program re-enters the Command Mode, you can either continue processing on the "Wordprocessing Disk", or re-insert the Drive 0 Master.

Similarly, type "LOAD" (without a filespec), and the program will pause with "FILESPEC" while you insert a disk with a file to be loaded.

6.0 The SPELL CHECK/CORRECT Module

The SPELL CHECK/CORRECT Module is initiated from within the Word Machine Command Mode by typing "CHECK" to the " ?? " prompt. The distributed System Master DISK 0 discette has all necessary programs and files for the Spell Check/Correct process. The disk designated DISK 1 contains the Dictionary file DICTNARY/DAT. This Disk should reside in Drive 1 if you have a TWO drive system.

If you have only ONE disk drive, the programs will prompt you for the insertion of the Dictionary disk into Drive 0 when it is needed.

6.1 How it works - (see System Flowchart in Section 6.6)

When you type "CHECK" in the Word Machine's Command Mode, a file called "X/X" is created. Control passes to program "SPELL/CMD" which checks the spelling of "X/X".

During the processing of SPELL/CMD, the total and unique word count first will appear on the screen. Next, if the Dictionary Disk is not present, SPELL/CMD will request that is be inserted. You may put it in EITHER Drive 0 or Drive 1. As the program checks your words a row of asterisks "***...." will appear on the screen - when the row reaches the right side of the screen, checking is done. SPELL/CMD next checks the Auxiliary Dictionary (file AUX/DOC) - which is on Disk 0. A file named BW/DOC with "unknown" (possibly misspelled) words from X/X is created on Disk 0. The program next requests "Place a System Disk in Drive 0 and hit ENTER" - place your System Disk 0 in Drive 0 and hit ENTER.

Program SPELL/CMD then passes control to program "CORECT/CMD" which allows you to correct possible misspellings in context. File "X/X" is modified here with your corrections. When complete the corrected file "X/X" is re-loaded into the Word Machine main program WORD48/CMD. You will then be back in the Wordprocessing mode with your corrected text in the Buffer.

6.2 More about Corrections in Context and "unknown words"

The corrections program will scroll through your text and highlight any words that it considers "unknown". An unknown word is one that simply does not exist in the Main or Auxiliary Dictionaries.

Several assumptions are made by "SPELL/CMD" when checking the text that you should be aware of, these are:

■ Upper/lower case is ignored - all words are treated as being in the same case. Single letter words are ignored. Words with numbers contained are analyzed for the alphabetic parts only.

■ Hyphenated words are separated into separate words for checking. The Dictionary does contain common prefixes and suffixes as valid words and as such will not show as unknown words.

■ A word's use in context is not considered - the word "two" misspelled as "tow" will not be caught.

■ Many proper names and places ARE included in the dictionary - however, these types of words will typically be flagged as "unknown".

During the correction process, when a word shows up highlighted in a line - four options are presented:

[Type Correction] - Simply typing in your correction will change the word in context. Your correction is NOT checked for proper spelling however. Your correction results in a permanent change to the text file.

[ENTER] to Pass Word - Hitting the ENTER key will accept the spelling of the word as is. The word will NOT be added to the Auxiliary Dictionary and WILL be flagged again if it appears again in the text.

[1] Pass word rest of Doc - This option will accept the spelling for the rest of the document but NOT add it to the Auxiliary dictionary. If the the word appears in another document it will be flagged again.

[2] Pass word rest of Doc - This choice will mark the word to be added perma-
And add to Dictionary   nently to your Auxiliary Dictionary (file AUX/DOC). When added in this manner, the word will NOT show as unknown for the rest of this session OR subsequent sessions.

6.3   Maintaining your Auxiliary Dictionary

The Auxiliary Dictionary file is designed as a Word Machine compatible "/DOC" type file. Words can be added to it or removed from it using regular Word Processing functions. The most practical means of adding to the Auxiliary dictionary however is by marking words during corrections in context. All words marked in this manner will AUTOMATICALLY be added to the Auxiliary Dictionary when the correction process is completed. Note: Option '2. in corrections marks the word.
Suppose you have a list of technical words that you want to add to the Auxiliary dictionary. You should type the list into the text buffer in a Wordprocessing session (using WORD48/CMD). Then type
"CHECK" and run the list through the check/correct process. This will insure that all words added to the Auxiliary Dictionary are unique.
The Auxiliary Dictionary may grow to the 276 lines allowed by the Word Machine buffer - this will be sufficient for about 2000 words. You can periodically check the list by (LOAD)ing it into the Word Machine and checking the line count. You will notice that graphics blocks are used to mark new words added from session to session.

6.4   Maintaining the Main Dictionary

Periodically you may Merge the Auxiliary Dictionary into the Main Dictionary using program MERGE/CMD. You may merge in words as frequently as you wish. The only limitation is the size to which your Main Dictionary may grow subject to the capacity of your disk. The Main Dictionary initially contains about 31000 words. It can grow to about 55,000 words on a double density system and 40,000 words on single density. Single density Model I users will preserve space on System Disk 0 by using this facility before AUX/DOC grows too large. One drive users will not be able to use this utility.
After merging in the file AUX/DOC, you should delete it with the KILL command from DOS. The correction program will automatically create a new AUX/DOC file during the next spelling session.

Instructions for using MERGE/CMD to merge words
from AUX/DOC into file DICTNARY/DAT

Place the Disk containing MERGE/CMD in Drive 0 and type "MERGE/CMD". You will be prompted for the following information in the order shown :

■ "Insert Disk with Auxiliary Dictionary in Drive 0 and hit ENTER" Your Auxiliary Dictionary should reside on the System Master Disk 0.

■ " Enter the name of the Auxiliary Dictionary ? " In most circumstances you will type "AUX/DOC". However, if for some reason you have another word list to add, you may specify that file to be merged in at this point.

■ " Place Main Dictionary DICTNARY/DAT in Drive 0, and a Formatted Disk in Drive 1, Hit ENTER when ready "

The Dictionary Disk (that is normally in Drive 1) is placed in Drive 0 and a blank Formatted disk is placed in Drive 1. The MERGE process will then begin. Several variables will determine the amount of time that the MERGE process will take (i.e. the size of the Auxiliary Dictionary, the size of the Main dictionary, the processor speed of your computer, the stepping rate of your drives etc..) - you may expect a wait of 15 minutes or longer in some cases

The MERGE process will first read your Auxiliary dictionary into memory, then read you Main Dictionary a word at a time, Merge in new words where appropriate and write out the expanded New Dictionary to Drive 1. The New Dictionary is also named DICTNARY/DAT but on Drive 1. When done creating the New Dictionary on Drive 1, the program will then copy the New Dictionary back over the Old Dictionary on Drive 0. When done, you will have two new copies of DICTNARY/DAT with your Auxiliary Dictionary merged in. Save one of these as a BACKUP in case of any future problems in reading the DICTNARY/DAT file.

6.5 Using Spell Check/Correct with Other Wordprocessing Files

To use the Spell Check/Correct Module independently - you must first COPY files SPELL/CMD, UNIQ/CMD and DICTNARY/BIN onto systems disks compatible with your word processor. Procedures to accomplish this are detailed in Section 7.3.

The SPELL/CMD program was designed to work independently from the Word Machine integration. As an independent program however - SPELL/CMD will require you to provide certain information provided as defaults by the Word Machine integration.

SPELL/CMD assumes that your Main Dictionary is file DICTNARY/DAT. It is important that you save your wordprocessing file in an "uncompressed pure" ASCII format or SPELL/CMD will not read it properly.

Besides finding unknown words the SPELL/CMD program DOES contain all of the facilities necessary for making corrections in context AND expanding your Auxiliary Dictionary. In the Word Machine integration these functions are performed by the CORECT/CMD program instead. Consequently you SHOULD NOT us the CORECT/CMD program to correct documents NOT created by the Word Machine.

A separate manual titled "SPELL - The Pel-Tek Spell Check/Correct System" is included with the distributed Word Machine 3.0 Plus package. The manual describes in detail the independent usage of the SPELL system. You will notice that the the Spell Check/Correct process takes on a different personality when used independently from

the Word Machine integration. This is primarily because the Word Machine uses a completely different correction program (CORRECT/CMD - compatible with Word Machine files) - and passes information to SPELL that automates file specifications and program chaining.

6.6   System Flowchart - The Spell Check/Correct System

WORD48/CMD

Word
    Processor

Text
    Buffer

W248/CMD

Text Printing
File Load
File Save

X/X

Text Buffer
Work
File

CORECT/CMD

Spelling
Corrections

SPELL/CMD

Spelling
Checker

DICTNARY/DAT

Dictionary
File

AUX/DOC

Auxiliary
Dictionary

BW/DOC

Unknown
Words

KEY:

Data
    Flow

Program
    Flow

Data
Fila

Program

23
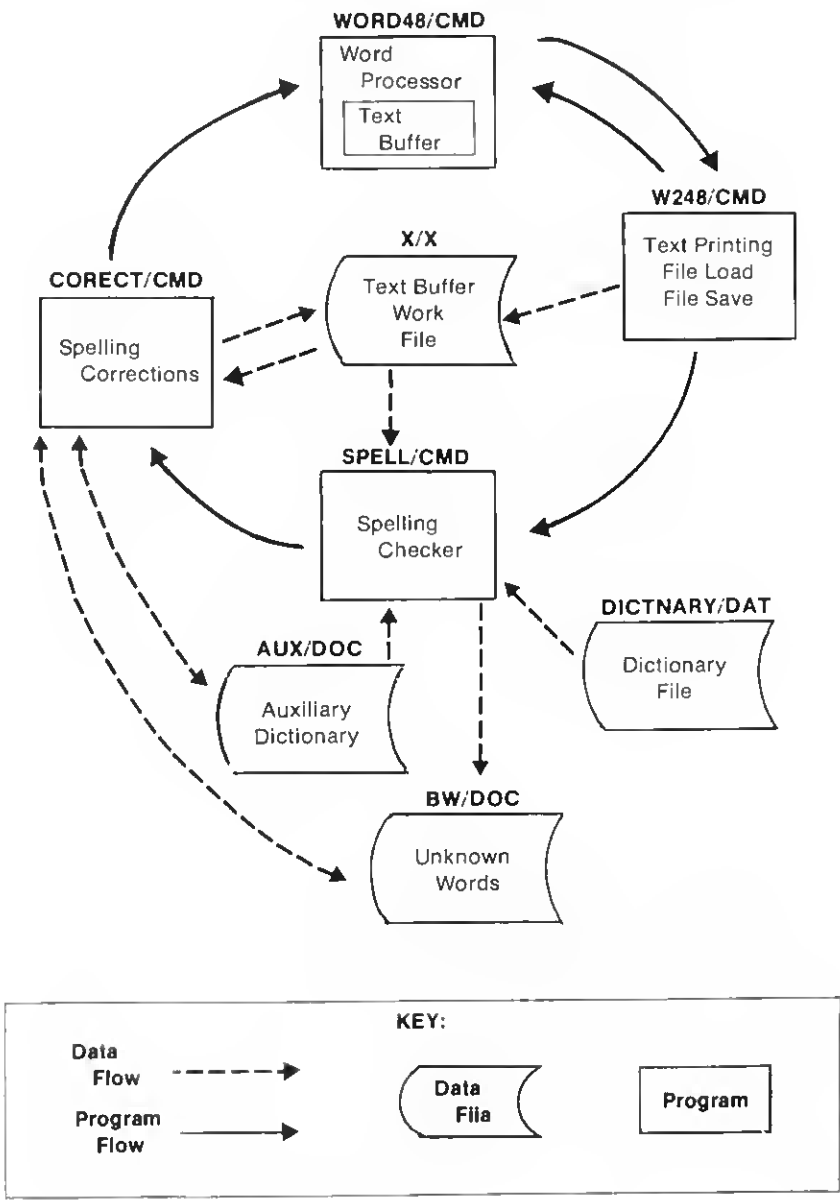
7.0 Systems Considerations

The Word Machine 3.0 Plus package is distributed with the TDOS operating system. TDOS is a "limited" operating system designed for Software Distributors. You have been provided either a TRS-80 Model I or Model III version depending on your order. TDOS is a fully compatible subset of the DOSPLUS 3.4 Operating System. A separate pamphlet titled "TDOS SYSTEM USER'S MANUAL" has been re-printed by Pel-Tek and is provided with your Word Machine 3.0 Plus package. Specific questions regarding the use of TDOS should be referred to M.S.S. at :

Micro-Systems Software, Inc.
4301-18
Boca Raton, Fla 33431
(305)-983-3390

7.1 Configuration of the Word Machine 3.0 Plus

Your distribution package contains two discettes. If you have a Model I system, one discette will have programs on both sides. The two discs are referred to as Disk 0 and Disk 1. Their contents are:

Disk Layouts

DISK 0 (Side 1)	WORD48/CMD	Program	Wordprocessing main program
	W248/CMD	"	Wordprocessing overlay
	SPELL/CMD	"	Spelling Checker
	CORECT/CMD	"	Spelling Corrections
	X/X	Data	Document "work" file
	BW/DOC	"	Unknown word file
	AUX/DOC	"	Auxiliary dictionary file
(Side 2 - Model I)	MERGE/CMD	Program	Auxiliary dictionary merge utility
	SOCCER/CMD	"	Indoor Soccer arcade game
	UNIO/CMD	"	Word usage utility
DISK 1	DICTNARY/DAT		Main Dictionary

NOTE: For Wordprocessing Only - use programs WORD48/CMD and W248/CMD

7.2 Backing up your discettes

Proper practices dictate that that you should BACKUP your distribution discettes. For Model I systems - all three sides provided should be backed up. For Model III systems - the two sides provided on Disks 0 and 1 should be backed up.
Refer to the BACKUP Command in the TDOS manual for complete details.

7.3 Transferring the Word Machine 3.0 to another D.O.S.

■ Transferring to a Single density system

TDOS configures its disk directories identically to TRSDOS 2.3. Consequently, the distributed disks can be copied directly to TRSDOS 2.3 OR ANY OTHER SYSTEM that recognizes the TRSDOS 2.3 format. The Word Machine disks should reside in Drive 1

when transferring to your DOS in Drive 0. Use the COPY Command from the DOS READY prompt and copy each and every file onto your own system. In a similar vein - A TRSDOS disk in Drive 0 will be able to READ a TDOS disk in drive 1 for the DIRECTORY and FREE space (features which unfortunately are missing from the TDOS system).

■ Transferring to a Double Density system

If you have the DOSPLUS operating system for the Model III - the the TDOS Model III discettes will be directly readable by your system.

For operating systems other than DOSPLUS the procedure is somewhat more difficult.

Most DOS's (including Model III'S TRSDOS 1.3) allow for the transfer of of data from Model I type single density discettes. Using TDOS, you would first Format a blank TDOS discette as single density, then COPY each and every program and file that you wish to transfer onto it.

Refer to the FORMAT Command in the TDOS manual. You should then refer to the manual for the particular D.O.S. that you want to copy to. Note that even though you may be copying onto a 40 track system, you should FORMAT the blank discette as 35 cylinders to make sure that the system Directory is on track 17.

Typically to transfer the Model III TDOS version of the Word Machine onto a Model III TRSDOS 1.3 system - you would follow the following steps:

■ Place the Word Machine 3.0 Disk 0 in drive 0 and a blank discette in Drive 1. Hit the RESET button and enter DOS READY.Then type "FORMAT :1".
■ Respond to the DATE and PASSWORD quiries by hitting [ENTER]. When the system asks "Number of cylinders (35-96)?", respond with
"35". The final question (For Model III only) is "Single or double density?". Respond "S" for single density.
■ Next COPY each and every program and file on Disk 0 to Disk 1 with the COPY Command as follows:

```
COPY WORD48/CMD:0 :1
COPY W248/CMD:0 :1
COPY SPELL/CMD:0 :1
COPY CORECT/CMD:0 :1
COPY X/X:0 :1
COPY BW/DOC:0 :1
COPY AUX/DOC:0 :1
COPY UNIQ/CMD:0 :1
COPY MERGE/CMD:0 :1
COPY SOCCER/CMD:0 :1
```

■ Prepare an empty TRSDOS 1.3 diskette (you DON't need BASIC). Place the TRSDOS 1.3 disk in drive 0 and the Formatted Single Density discette in drive 1. Type "CONVERT" (to use the TRSDOS CONVERT utility, refer to you TRSDOS manual for details). Respond "1" when you are asked for "SOURCE DRIVE". TRSDOS will then Copy down all files from the Single Density diskette onto the TRSDOS 1.3 system discette.
■ Use the same procedure to copy the disk with DICTNARY/DAT onto a TRSDOS system disk.

NOTES

Word Machine 3.0 as a Remote Typesetter

Word Machine 3.0 is ideally suited to the job of typesetting by remote typesetters. The entire text of this manual was transmitted to a Comp/Edit 5310 by a TRS-80 Model 3. The transmitted files were entirely prepared using Word Machine 3.0 as the file generator.

The usage of remote typesetting is one of the rapidly growing applications of telecommunications. It's popularity is in large part due to the tremendous cost savings available and the speed at which the job can be done.

The firm which produced this manual was:

QUALITY PRINTING AND TYPESETTING
243 SO. LINCOLN
WEST POINT, NEBRASKA 68788
402-372-5182

Any and ALL questions relative to the service, it's cost, etc. should be directed to them directly and not to PEL-TEK.

Quality Printing & Typesetting has over 7000 different styles and sizes of type to choose from. The price for any job is quoted based on it's individual requirements, but quotations are free and available before any work is begun.

Files from any computer can be taken via modem provided they are ASCII files, and Model 1/3 TRS-80 Discs in any density or DOS can be read directly, avoiding the long distance charges. Files can also be taken from a filespace on Compu-Serve.

NOTES

APPENDICIES

APPENDIX I

GENERAL SPECIFICATIONS AND INFORMATION

Publisher and Distributor

Pel-Tek, P.O. Box 1026, Southampton Pa. 18966
Tel: 800-523-2445 ext 19, in Penna 800-346-7511 ext 19

Compatible Computer

TRS-80(tm) Model I, ,III, or 4(operates in Model III mode)
Minimum 48K memory, Minimum 1 Disk drive

Distributed Operating System

TDOS - A Subset of DOSPLUS 3.4. Separate versions
provided for Model I and III. Publisher:
Micro Systems Software, 4301-18, Boca Raton, Fla 33431
(305)-983-3390

Authors and Programs

WORD48/CMD   ⎧ Written by Ed Levy c/o Pel-Tek
W248/CMD   ⎪ Z80-Machine code - compiled with
CORECT/CMD   ⎨ ZBASIC 2.0 from SIMUTEK, 48937
SOCCER/CMD   ⎩ E. Speedway Blvd., Tuscon Az. 85712

SPELL/CMD   ⎧ Written by John McNamee c/o One
MERGE/CMD   ⎪ Stop Software, 7560 McLaren Ave.,
UNIO/CMD   ⎨ Canoga Park, CA 91307
              ⎩ Machine Language

Wordprocessing Specs.

Line oriented editor. Creates uncompressed ASCII files. True
horizontal cursor operation. 276 lines available in text buffer.
Uses Memory extents 27690-64975 dec. Parallel printer compatible-
with auto carriage return.

Forms handling - software driven: Left margin, top and bottom
margins, page eject, skip lines, single/double space, headers,
footers and page numbering.

Wordprocessing programs : WORD48/CMD and
W248/CMD

Spell Check/ Correct specs.

Dictionary approx 31000 packed "literal" wordlist.
File DICTNARY/DOC - packed dictionary, File AUX/DOC -
Auxiliary dictionary, File BW/DOC -unknown words, Prog
SPELL/CMD -main checking program, CORECT/CMD -
integrated corrections in context, MERGE/CMD and
UNIO/CMD - system utilities.

APPENDIX II

DIFFERENCES BETWEEN WORD MACHINE
Versions 2.0 and 3.0

This section applies to owners of the Word Machine 2.0. All additional features in version 3.0 are implemented in terms of new Command Mode commands, Line editing control keys, Print time variables, and FORMAT variables. You will note that the general operating envionment of version 3.0 is essentially the same as version 2.0.

FILE COMPATIBILITY

The Format variables saved with files created by version 2.0 are incompatible with version 3.0. The common denominator between files created by the two versions is that both versions treat files with /DOC extensions the same.

To convert a version 2.0 file to version 3.0 - first execute version 2.0 and load the file to transfer to the buffer. Let's call it "ANY/EXT". Type "FORM" and make a note of the values of the FORMAT variables. Then SAVE the Buffer with a new file name "ANY/DOC".

Insert version 3.0 disk in Drive 0 and execute the program. Place the disk with "ANY/DOC" in Drive 1 and type "LOAD ANY/DOC" from the Command Mode. Type "FORM" and manually change all appropriate FORMAT variables. Next save the file with the format variables by typing "SAVE ANY". Now the file "ANY/EXT" has been converted to file "ANY" in the version 3.0 format.

FEATURES ADDED ELIMINATED AND CHANGED

	ELIMINATED FROM WORD MACHINE 2.0	ADDED TO WORD MACHINE 3.0
COMMAND MODE COMMANDS	PROOF P C	CHECK EH EF PT LOAD filespec SAVE filespec
LINE EDITING KEYS	[↑][CLEAR] - replaced [^][G] - modified	[↑][M] [^][A] [↑][P] [SHIFT][CLEAR] [↓]
PRINT TIME VARIABLES	;P - replaced	;G filespec
FORMAT VARIABLES	(6) Tab positions - modified	(6) Tab spacing (8) Header data (9) Footer data (10) No. copies (12) First page no. (14) Exec ; lines
OTHER DIFF-ERENCES	-276 Lines instead of 290 lines avail in Buffer -Wordwrap speeded up -Files saved in more compact form to save space -Help screen shows at Command Prompt -Spell Check/Correct Module included -TDOS operating system included -Indoor Soccer arcade game included -All known bugs have been fixed	

APPENDIX III
SUMMARY OF OPERATIONS

Command Mode Commands

H .... Help
NEW .... Clear and Re-start
OUIT .... Exit Program
F .... Fill Mode (extend text @ end)
I .... Insert single line
I+ .... Insert miltiple lines
T .... Top of Buffer
B .... Bottom of Buffar
PT .... Print from Top
PP .... Print from line pointer
E .... Edit current line
EH .... Edit Header line
EF .... Edit Footer line
FORM ...... Display/Change Format Vars.
K .... Kill (delete) current line
KB .... Kill block of lines
LOAD *filespec.*.Load Text file from disk
SAVE *filespec.* Save Text file to disk
CHECK ..... Initiate Spell Checker
D .... Go DOWN to next line
U .... Go UP to next line
D*string* ..... Down to "string" (start of line)
U*string* ..... Up to "string" (atart of line)
D*/string* ..... Down to ambadded "string"
U*/string* ..... Up to embedded "atring"
Scrolling .... Hold down U or D keys and
[ENTER] simultaneously

SUMMARY OF EMBEDDED COMMANDS

;E .... Eject to next page
;Enn .... Eject nn lines
;X .... Terminate printing
;K .... End of block delete mark
;v1,v2,v3 ..... ASCII values (0-255) for printer
control equivalent to
LPRINT CHR$(v1)CHR$(v2)CHR$(v3)...
;G *filespec* ... Get and print an external file

CURSOR CONTROL AND LINE EDITING

[ENTER]	Go to next line for (F)ill or (I+)insert. Update line and return to Command Mode for (E)dit or (I)nsert.
[CLEAR]	Exit from (F)ill or (I+)insert. Cancel any changes made in (E)dit or (I)nsert.
[‹]	Move Cursor left ona space
[→]	Mova Cursor right one space
[SHIFT][←]	Tab cursor laft
[SHIFT][›]	Tab cursor right
[↑] [I]	Begin character inserts
[↑] [D]	Delata charactar at Cursor
[↑] [H]	Hack and clear to end of line
[↑] [X]	Extend lina
[↑] [M]	Canter text on lina (Middla)
[↑] [A]	Enter ASCII value
[↑] [G]	Begin Graphics moda - creates patterns w/2,3,5,6,8,9 keys. Hit "." to register pattern.
[↑] [P]	Place "pause mark" (must be paired)
[^]	End character inserts. End Graphics.
[SHIFT][CLEAR]	TDOS function to print the Video Screen to the printer.
[↲]	Repeat key

FORMAT VARIABLES
CODES AND DEFAULTS
(Variables 1-9 are saved when file is SAVEd)

CODE	DESCRIPTION	DEFAULT
1	Top Margin	7
2	Bottom Margin	7
3	Left Margin	8
4	Line Length	62
5	Page Length	66
6	Tab Spaces	6
7	Reverse caps	0 (no)
8	Header data	(blank)
9	Footer date	(blank)
10	No. of copies	1
11	Spacing	1
13	Print ; line	0 (no)
14	Execute ; line	1 (yes)
15	Pause at Bottom	0 (no)